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Operative Procedures in Corneal Lesions.

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The introduction of myotics, into ophthalmic practice, has so changed the methods of treatment of corneal lesions, that older expedients, which were proving their value, have been of late ignored to a considerable extent, or at least not utilized as frequently as they might have been with advantage. I refer especially to *syndectomy*, *Saemisch's* operation of cutting through the base of certain forms of corneal ulcer, and *paracentesis* of the cornea. In cases of vascular pannus of long standing, where increase of tension is not present to indicate other proceedures, the writer has found *syndectomy* of decided benefit. The only apparent reason for its neglect, is in the failure to secure good results from incomplete syndectomies. To be of value a zone of conjunctiva must be removed completely around the cornea. Saemisch's operation has more than answered my expectation, not only in rodent ulcers, but also in those which are indolent, and where time was of great importance to the patient, I have not failed to resort to paracentesis of the cornea where large abscesses existed, although in common with the general professional experience, I have not found it as necessary in hypopion as was formerly supposed

The object of this paper is, more especially, to call attention to those corneal lesions, which are associated with, and probably caused by, adhesions of the iris to the capsule, posterior synechia. It is unquestionably the fact that very many cases of iritis go unrecognized, and that in a considerable proportion of those which are recognized

posterior synechiae result. The effect of these adhesions, in the great majority of cases, is to produce recurrences of iritis, ultimate *occlusion* of the pupil, and thus secondary *glaucoma*. I am aware that the opinion of many ophthalmic surgeons practicing in large centers of population runs counter to that of the surgeons of twenty-five years ago in this respect, and we meet with the assertion that adhesions of the iris, so long as they are limited to not more than one-fourth of the periphery of the pupil, and on one side, are not productive of mischief. In the larger cities, patients have opportunities for the early recognition and skilfull treatment of iritis, which are wanting in thinly settled districts; and from this reason, I believe, the proportion of cases of secondary or chronic iritis is less than it otherwise would be. My experience would indicate that the majority of cases of iritis are considered at first as cases of neuralgia, and I see many times more cases of iritic adhesion, than I do of simple primary iritis. It is in this class of cases, that I have encountered three varieties of corneal lesion, which have apparently resulted from the synechiae left by former iritis. As a rule, in all the forms the tension of the globe is increased, but in consequence of the haziness of the cornea, and capsular deposits, satisfactory ophthalmoscopic examination is impossible.

In the first form, the characteristic lesion has been, a circumscribed infiltration of the cornea, preceded by intense supra-orbital pain, and followed by tedious sloughing of the superficial layers, the gray bottomed ulcer eventually becoming vascular, the process of repair accompanied by an encouraging relief from pain, only too soon to be broken in upon, by a repetition of the process, with each attack the vascular pannus extending.

The second variety was characterized by diffuse, deep, non-vascular infiltration of the cornea, extending from one side and gradually spreading over the cornea, in these cases also, paroxysms of supra-orbital neuralgia have occurred with greater or less periodicity, and with them each time peri-corneal injection.

The third variety has been characterized by the occurrence of the so-called *bullous keratitis*. In all these cases, the recurrence of the attacks, the occasional periodicity and the increased tension, indicate a process allied to the glaucomatous. If we accept *Wecker's* definition of glaucoma, "*The expression of a disturbance of equilibrium between secretion and excretion, with increase in the contents of the eye and increased tension*," it is a form of glaucoma, and in this class of cases it may either be due to the blocking up of the spaces of transudation in consequence of chronic inflammation, or increased secretion in consequence of chronic congestion; and here is where, it seems to me, the danger from a single synechia, however small, exists. The constant demands for movement made upon the iris in changes of light and accommodation, are interfered with, the iris becomes irritable, and there results, if nothing worse, a chronic congestion, ever ready to pour fluid into the chambers of the globe faster than it can be removed by natural processes.

When complete exclusion of the pupil results, we have the iris itself pushed forward and blocking up the spaces of transudation.

The indications for treatment of corneal lesions depending upon synechia of the iris, are these: First—In those cases where synechia exists without exclusion of the pupil; to release the iris from the strain caused by the adhesion. This can be accomplished by an iridectomy which shall destroy the integrity of the *sphincter pupillæ*; the removal of the iris need not be broad, nor need it extend to the circumference, although if the tension were greatly increased it would be advisable to so extend it. Second—where complete exclusion of the pupil exists; the action of the sphincter being already destroyed, to restore communication between the anterior and posterior chambers, and to relieve the place of transudation. This will require a broad iridectomy extending to the corneal margin. It is very probable that many of the failures to relieve the chain of morbid processes induced by posterior synechia, have been due either to attempts to break up adhesions without cutting the iris, or where iridectomy was made, to adhesions of the iris in the corneal wound. This last can, as a rule, be prevented by the use of Eserine.